

ABSTRACT

A method applicable in the field of electric light source technology for
5 thoroughly eliminating "Electrophoresis effects" of a DC fluorescent lamp tube is
used for the DC fluorescent lamp. It is characterized by that this method involves
changing the relative positions and structures of the cathode and anode of the lamp
tube solely and/or simultaneously, coating a euphotic infrared film on either inside or
outside wall at the cathode end of the lamp tube, placing mercury-absorbed material
10 into the vent-pipe at the anode end, assembling a heat-preservation sealed enclosure
with high transparency under the lampshade and charging krypton gas and xenon gas
accounting for 20-60% of the total volume of inert gases with volumeter. The method
can thoroughly eliminate "Electrophoresis effects" of DC fluorescent lamp tube and
has solved the extremely difficult problem in the world, and prolonged the working
15 life of the lamp tube, with the advantages of simple structure and low cost.

